Amendments to the Claims:

This listing of claims will replace all prior versions and listings of claims in the application:

Listing of claims:

1. (Currently amended) A method of operating a communication device with a boot PROM, comprising:
initializing the communication device from routines stored on the boot PROM;
reading a device ID indicating a model and revision from the communication device;
sending the device ID to a management device over a communications link;
initiating a firmware upgrade without administrator intervention based on the device ID;
selecting a firmware at the management device;
downloading the firmware to the communication device; and
running the firmware on the communication device.

2. (Original) The method of claim 1, further comprising:
storing the downloaded firmware into a RAM memory.

3. (Original) The method of claim 1, further comprising:
storing the downloaded firmware into a non-volatile machine usable storage media.

4. (Original) The method of claim 3, wherein the non-volatile machine usable storage media is selected from the group consisting of a Flash memory device, an electrically erasable programmable read only memory (EEPROM) device, and a one time programmable (OTP) device.

5. (Original) The method of claim 3, wherein the boot PROM routines are stored on the non-volatile machine usable storage media.

6. (Original) The method of claim 3, wherein the boot PROM routines and device ID are stored on the non-volatile machine usable storage media.

7. (Original) The method of claim 1, further comprising:
sending a version identifier of a stored firmware from a non-volatile machine usable storage media to the management device.

8. (Original) The method of claim 1, wherein the device ID is read from a machine readable storage device.

9. (Original) The method of claim 8, wherein the device ID storage device is selected from the group consisting of a Flash memory device, a read only memory (ROM), an electrically erasable programmable read only memory (EEPROM) device, and a one time programmable (OTP) device.

10. (Original) The method of claim 1, wherein the boot PROM is selected from the group consisting of a Flash memory device, a read only memory (ROM), an electrically erasable programmable read only memory (EEPROM) device, and a one time programmable (OTP) device.

11. (Original) The method of claim 1, wherein the boot PROM and device ID are stored on a single machine readable storage medium.

12. (Original) The method of claim 1, wherein downloading firmware comprises downloading diagnostic firmware.

13. (Currently amended) A method of operating a communications management device, comprising:

initializing one or more associated communication devices from routines stored on a boot PROM of each of the one or more associated communication devices;

receiving a device ID from each of the one or more associated communication devices to determine whether any of the one or more associated communication devices require a firmware upgrade;

initiating a firmware upgrade without an administrator based on the device ID of each of the one or more associated communication devices;

selecting a software program associated with the device ID of each of the one or more associated communication devices that require a firmware upgrade; and

downloading the software program associated with the device ID to each of the one or more associated communication devices that require a firmware upgrade.

14. (Original) The method of claim 13, wherein receiving a device ID from each of one or more communication devices further comprises receiving a device ID that uniquely identifies the communication device.

15. (Currently amended) The method of claim 13, wherein receiving a device ID from each of the one or more associated communication devices further comprises receiving a device ID that identifies the associated communication device model.

16. (Currently amended) The method of claim 13, wherein receiving a device ID from each of the one or more associated communication devices further comprises receiving a device ID that identifies the associated communication device model and revision.

17. (Currently amended) The method of claim 13, wherein receiving a device ID from each of the one or more associated communication devices further comprises receiving a device ID that uniquely identifies the software program for the associated communication device.

18. (Currently amended) The method of claim 13, wherein receiving a device ID from each of the one or more associated communication devices further comprises receiving a device ID that uniquely identifies one or more software ~~programs~~ routines for the associated communication device.

19. (Original) The method of claim 13, further comprising:
updating a store of firmware at the communications management device.

20. (Currently Amended) A method of operating a communications rack chassis with a management card and at least one communication card, comprising:
initializing the at least one communication card from routines stored on a boot PROM of the communication card;
receiving a device ID from each of the at least one communications card to determine whether any of the one or more associated communication devices require a firmware upgrade;
initiating a firmware upgrade without an administrator based on the device ID of each of the at least one communications card;
selecting a firmware program associated with the device ID of each of the at least one associated communication card that require a firmware upgrade; and
downloading the firmware program associated with the device ID to each of the at least one associated communication card that requires a firmware upgrade.

21. (Original) The method of claim 20, further comprising:
storing the downloaded firmware into a RAM memory of each of the at least one communication card.

22. (Original) The method of claim 20, further comprising:
storing the downloaded firmware into a non-volatile machine usable storage media of each of the at least one communication card.

23. (Original) The method of claim 20, further comprising:
sending a version identifier of a stored firmware from a non-volatile machine usable storage media of each of the at least one communication card to the management card.

24. (Original) The method of claim 20, wherein the boot PROM and device ID are stored on a single machine readable storage medium of each of the at least one communication card.

25. (Original) The method of claim 20, further comprising:
updating a repository of firmware stored on the management card.

26. (Original) The method of claim 25, wherein the repository of firmware is updated remotely across a communication link.

27. (Currently amended) A method of operating a communications system, comprising:
initializing one or more communication devices from routines stored on a boot PROM of each of the one or more communication devices;
receiving a device ID from each of one or more communication devices at a management device;
initiating a firmware upgrade without an administrator based on the device ID of each of the one or more communication devices;
selecting a software program associated with the device ID of each of the one or more communication devices that require a firmware upgrade; and
downloading the software program associated with the device ID to each of the one or more communication devices that require a firmware upgrade.

28. (Original) The method of claim 27, further comprising:

storing the downloaded software program into a RAM memory of each of the one or more communication devices.

29. (Original) The method of claim 27, further comprising:
storing the downloaded software program into a non-volatile machine usable storage media of each of the one or more communication devices.

30. (Original) The method of claim 27, further comprising:
sending a version identifier of a stored software program from a non-volatile machine usable storage media of each of the one or more communication devices to the management device.

31. (Original) The method of claim 27, wherein the boot PROM and device ID are stored on a single machine readable storage medium of each of the one or more communication devices.

32. (Currently amended) The method of claim 27, further comprising:
updating a repository of software programs stored on the management device.

33. (Original) The method of claim 32, wherein the repository of software program is updated remotely across a communication link of the communications system.

34. (Currently amended) A method of operating an asymmetric digital subscriber line (ADSL) communication device with a boot PROM, comprising:
initializing the ADSL communication device from routines stored on the boot PROM;
reading a device ID indicating a model and revision from the ADSL communication device;
sending the device ID to a management device over a communications link;
initiating a firmware upgrade without an administrator based on the device ID;

selecting a firmware for the communication device at the management device;
downloading the firmware to the ADSL communication device; and
running the firmware on the ADSL communication device.

35. (Original) The method of claim 34, further comprising:
storing the downloaded firmware into a RAM memory of the ADSL communication device.

36. (Original) The method of claim 34, further comprising:
storing the downloaded firmware into a non-volatile machine usable storage media of the ADSL communication device.

37. (Original) The method of claim 34, further comprising:
sending a version identifier of a stored firmware from a non-volatile machine usable storage media of the ADSL communication device to the management device.

38. (Original) The method of claim 34, wherein the boot PROM and device ID are stored on a single machine readable storage medium of the ADSL communication device.

39. (Original) The method of claim 34, wherein the device ID identifies a model and a revision of the ADSL communication device.

40. (Original) The method of claim 34, wherein sending the device ID to a management device over a communications link further comprises sending the device ID and configuration information.

Claims 41- 68 are cancelled.

69. (Currently amended) A machine-usable medium having machine-readable instructions stored thereon for execution by a processor of a telecommunication device to perform a method comprising:

initializing the telecommunication device from routines stored on a boot PROM of the telecommunications device;

reading a device ID indicating a model and revision from the telecommunication device;

sending the device ID to a management device over a communications link;

initiating a firmware upgrade without an administrator based on the device ID;

selecting a firmware for the telecommunications device at the management device;

downloading the selected firmware to the telecommunication device; and

running the firmware on the telecommunication device.

70. (Original) The machine-usable medium of claim 69, further comprising:

storing the downloaded firmware into a RAM memory.

71. (Original) The machine-usable medium of claim 69, further comprising:

storing the downloaded firmware into a non-volatile machine usable storage media.

72. (Original) The machine-usable medium of claim 71, wherein the non-volatile machine usable storage media is selected from the group consisting of a Flash memory device, an electrically erasable programmable read only memory (EEPROM) device, and a one time programmable (OTP) device.

73. (Original) The machine-usable medium of claim 71, wherein the boot PROM routines are stored on the non-volatile machine usable storage media.

74. (Original) The machine-usable medium of claim 71, wherein the boot PROM routines and device ID are stored on the non-volatile machine usable storage media.

75. (Currently amended) A machine-usable medium having machine-readable instructions stored thereon for execution by a processor of a telecommunications management device to perform a method comprising:

initializing one or more associated telecommunication devices from routines stored on a boot PROM;

receiving a device ID from each of one or more associated telecommunication devices;

initiating a firmware upgrade without an administrator based on the device ID of each of the one or more associated telecommunication devices;

selecting a ~~software~~ firmware program associated with the device ID of each of one or more telecommunication devices that require a firmware upgrade; and

downloading the ~~soft~~firmware program associated with the device ID to each of one or more telecommunication devices that require a firmware upgrade.

76. (Original) The machine-usable medium of claim 75, wherein the downloaded firmware is a diagnostic firmware.

77. (Original) The machine-usable medium of claim 75, further comprising:

updating a repository of firmware stored on the telecommunication management device.

78. (Original) The machine-usable medium of claim 77, wherein the repository of firmware is updated remotely across a communication link.

79. (Original) The machine-usable medium of claim 75, further comprising:

storing the downloaded firmware into a RAM memory of each of the one or more telecommunication devices.

80. (Original) The machine-usable medium of claim 75, further comprising:

storing the downloaded firmware into a non-volatile machine usable storage media of each of the one or more telecommunication devices.

81. (Currently amended) In a telecommunication device having a boot PROM, a communications interface, a device ID storage media, and a processor coupled to the boot PROM, the device ID storage media, and the communications interface, a method of operating the telecommunication device, comprising:
initializing the telecommunication device from routines stored on the boot PROM;
reading a device ID indicating a model and revision from the telecommunication device;
sending the device ID to a management device over a communications link;
initiating a firmware upgrade without an administrator based on the device ID;
selecting a firmware at the management device;
downloading the firmware to the telecommunication device; and
running the firmware on the telecommunication device.